# Technical training.
## Product information.

# G12 Displays and Controls

Edited for the U.S. market by:
**BMW Group University**
Technical Training
ST1501 8/1/2015

## BMW Service

# General information

### Symbols used

The following symbol is used in this document to facilitate better comprehension or to draw attention to very important information:

Contains important safety information and information that needs to be observed strictly in order to guarantee the smooth operation of the system.

### Information status and national-market versions

BMW Group vehicles meet the requirements of the highest safety and quality standards. Changes in requirements for environmental protection, customer benefits and design render necessary continuous development of systems and components. Consequently, there may be discrepancies between the contents of this document and the vehicles available in the training course.

This document basically relates to the European version of left hand drive vehicles. Some controls and components are arranged differently in right-hand drive vehicles than shown in the graphics in this document. Further differences may arise as the result of the equipment specification in specific markets or countries.

### Additional sources of information

Further information on the individual topics can be found in the following:

- Owner's Manual
- Integrated Service Technical Application.

Contact: conceptinfo@bmw.de



The information contained in this document forms an integral part of the technical training of the BMW Group and is intended for the trainer and participants in the seminar. Refer to the latest relevant information systems of the BMW Group for any changes/additions to the technical data.

Information status: **June 2015**
**BV-72/Technical Training**

# G12 Displays and Controls

## Content

# G12 Displays and Controls

## Content

# G12 Displays and Controls

## Content

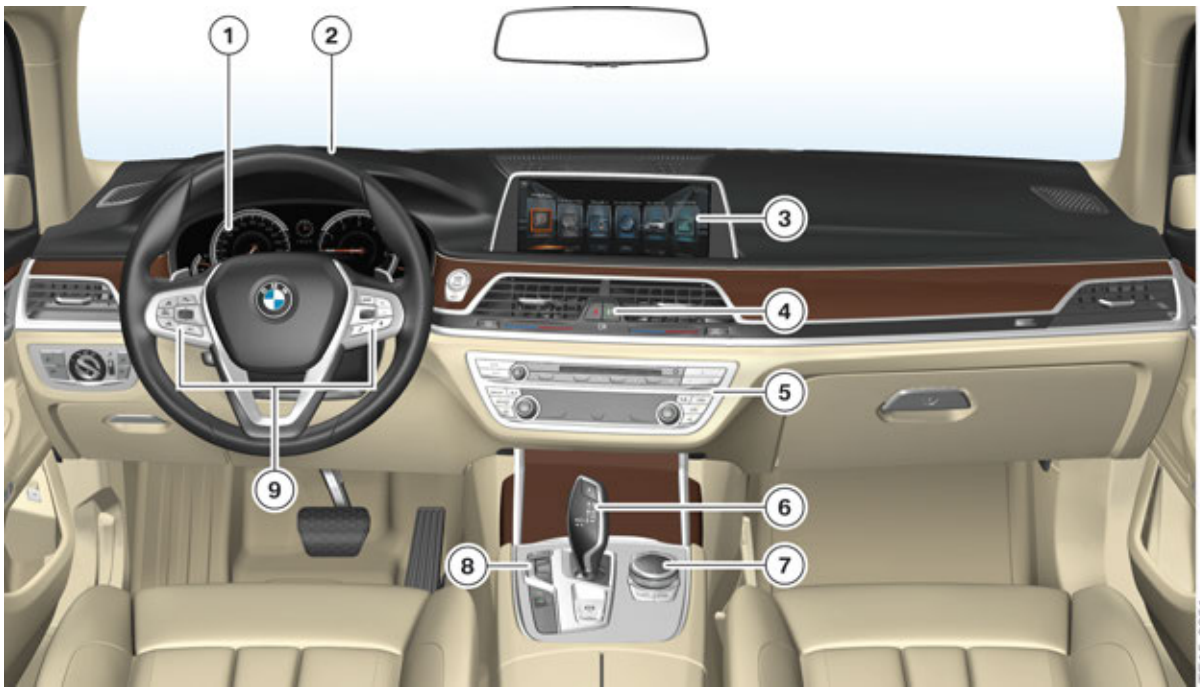
# G12 Displays and Controls

# 1. Introduction

## 1.1. Overview

The typical BMW display and operating concept is also used in the new BMW 7 Series G12. The main features of iDrive were kept, such as separation of displays and controls as well as separation of the driving functions immediately in front of the driver and the convenience functions integrated in the center of the vehicle.

Greater emphasis of driver orientation is achieved by the driver-facing center stack as well as the arrangement of the driver assistance functions on the steering wheel. In addition, the Multifunction Steering Wheel (MFL) provides the driver with fast access to the most important communication and entertainment functions.




G12 Overview of driving cockpit

| Index | Explanation |
|---|---|
| 1 | Instrument Panel |
| 2 | Head-Up Display (HUD) |
| 3 | Central Information Display (CID) |
| 4 | Intelligent Safety Button |
| 5 | Heating/Air Conditioning/Radio Control Panel |
| 6 | Gear Selector |
| 7 | Controller |
| 8 | Driving Experience Switch |
| 9 | Multifunction Steering Wheel |

During the design process, extra attention was given to ensure a clear and optimum structuring of the driver's cockpit. In addition, the vehicle interior was equipped with additional, innovative controls.

# G12 Displays and Controls

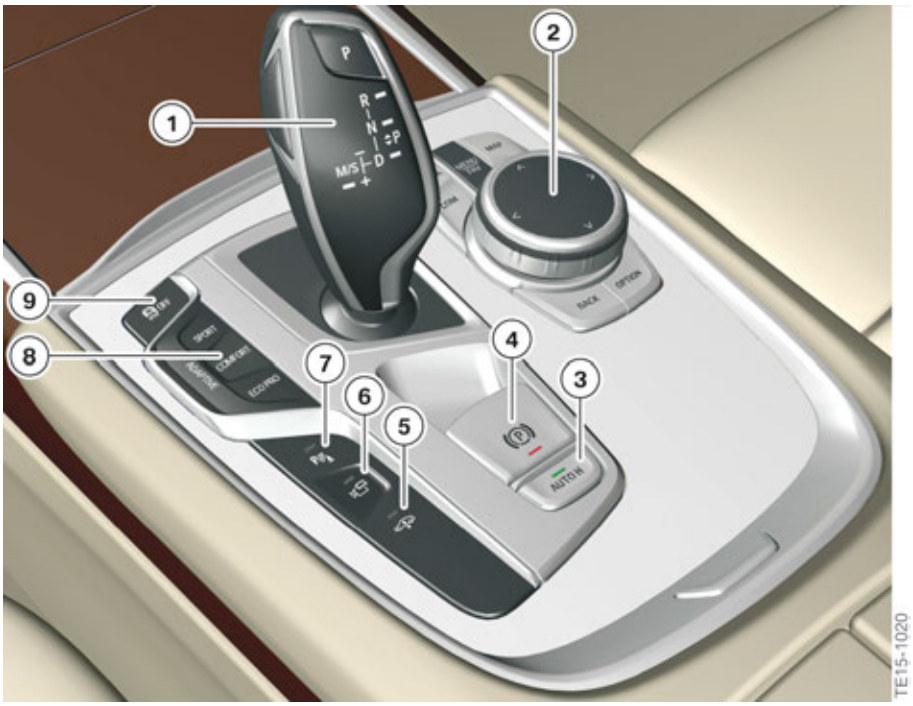
## 1. Introduction

With the model launch of the G12, the Central Information Display (CID) has evolved with it's touch-screen operating function. There are also additional functions that are controlled by touch operation, such as the heating and air conditioning control.

For the first time, function applications are now also performed by the use of gesture control (SA 6U8).

Another completely new method of function control in the G12 is the BMW Touch Command (SA 6U9). The removable tablet PC (BMW Touch Command) replaces the rear compartment controller of the F01/F02.

### 1.2. Controls in Center Console




G12 Controls in the center console

| Index | Explanation |
|---|---|
| 1 | Gear Selector |
| 2 | Controller |
| 3 | Automatic hold |
| 4 | Electromechanical Parking Brake |
| 5 | Two-axle ride level control |
| 6 | Surround view |
| 7 | Park Distance Control |
| 8 | Driving experience switch |
| 9 | Dynamic Stability Control |

# G12 Displays and Controls

## 1. Introduction

### 1.3. Radio control panel

In the new BMW 7 Series, the favorite buttons have been re-assigned with the introduction of a newly designed radio control panel. Of the 8 favorite buttons in the BMW 7 Series, ConnectedDrive access is now pre-assigned to one button. The assignment of the favorite buttons can be cleared by simultaneously pressing buttons 1 and 8 (ConnectedDrive button).


G12 Radio control unit

| Index | Explanation |
|---|---|
| 1 | Change entertainment source |
| 2 | Traffic reports |
| 3 | ON/OFF, Volume |
| 4 | Favorite buttons |
| 5 | ConnectedDrive |
| 6 | CD/DVD eject button |
| 7 | Change station/track |

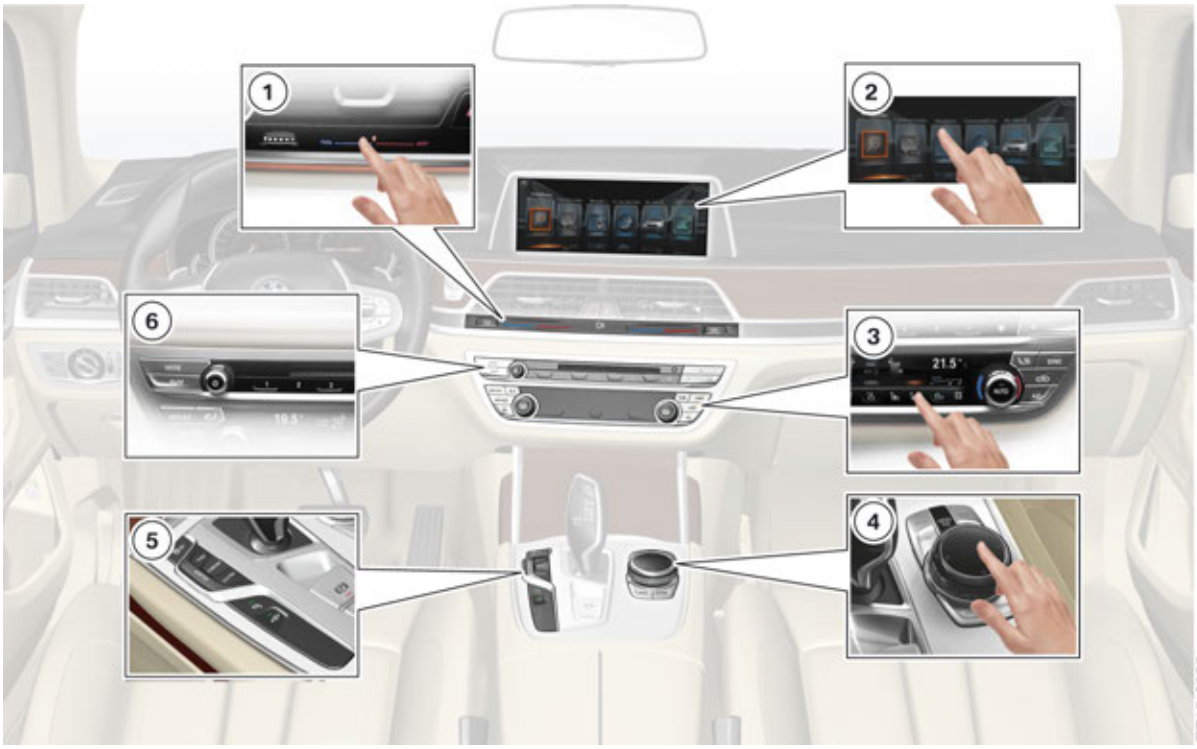
Further information on the controls for the heating / air conditioning control panel is provided in the technical training manual “ST1501 G12 Climate Control”.

# G12 Displays and Controls

## 1. Introduction

### 1.4. Touch operation

The following graphic provides an overview of the functions and applications that can be controlled by touch operation in the new BMW 7 Series.




G12 Overview of driving cockpit, touch operation

| Index | Explanation |
|---|---|
| 1 | Stratification control panel for the Heating/Air Conditioning system |
| 2 | Central Information Display (CID) with touch operation |
| 3 | Heating/Air Conditioning control panel |
| 4 | Controller with touch control panel |
| 5 | Buttons in the Center Console |
| 6 | Favorite buttons on the radio control panel |

# G12 Displays and Controls

## 2. Instrument Cluster

### 2.1. Introduction

The BMW 7 Series is fitted with a dynamic digital instrument cluster (SA 6WB).

The dynamic digital instrument cluster is equipped with a TFT display and therefore allows for situation-dependent display of information that is relevant to the driver. This flexible display of information achieves a maximum degree of clarity and comfort as well as the following:

- Minimization of driver distraction by optimum arrangement of related functions and situation-based displays
- Improvement of the driving experience by the display hierarchy and design adapted to the driving situation
- Improved driving comfort through the display of new indicators and functions (e.g. picture-in-picture map display on the instrument cluster).

### 2.2. Dynamic digital instrument cluster

The dynamic digital instrument cluster is offered as standard equipment in the G12.

#### 2.2.1. Display

The dynamic digital instrument display has a 12.3" TFT display with a resolution of 1920 x 720 pixels and covers an extended area of the instrument cluster. This means that is also possible to display the fuel and temperature gauges and the needles by means of the TFT display in addition to the speed reading and engine speed display.


G12 TFT display in the dynamic digital instrument cluster

# G12 Displays and Controls

## 2. Instrument Cluster

### 2.2.2. Driving modes

The 3 driving modes are also visually distinguished on the dynamic digital instrument cluster.


G12 Driving modes of the dynamic digital instrument display

# G12 Displays and Controls

## 2. Instrument Cluster

| Index | Explanation |
|---|---|
| 1 | COMFORT mode |
| 2 | SPORT mode |
| 3 | ECO PRO mode |

### 2.2.3. Displays

The indicator/warning lights are shown both as graphic indicators on the display and fixed chamber lights.

For example, the turn indicators and fog lamp indicator are shown on the TFT display. Every light indicator located outside the TFT display is a fixed chamber light, like the engine malfunction and parking brake indicators.


BMW 7 Series dynamic digital instrument display indicator/warning lights

| Index | Explanation |
|---|---|
| 1 | Side light/driving light |
| 2 | Anti-lock Brake System (ABS) |
| 3 | Hazard warning light |
| 4 | Seat belt warning, rear passenger compartment |
| 5 | Seat belt warning |
| 6 | Lane departure warning |
| 7 | Airbag system |
| 8 | Turn signal indicator light and hazard warning light, left |
| 9 | Fog light |
| 10 | High-beam assistant |

| Index | Explanation |
|---|---|
| 11 | High-beam headlight |
| 12 | Fog light |
| 13 | Turn signal indicator light and hazard warning light, right |
| 14 | Steering system |
| 15 | Automatic Hold |
| 16 | Hazard warning light |
| 17 | Parking brake |
| 18 | Dynamic Stability Control deactivated/Dynamic Traction Control activated |
| 19 | Brake system |
| 20 | Dynamic Stability Control |
| 21 | Tire pressure control |
| 22 | Engine malfunction |

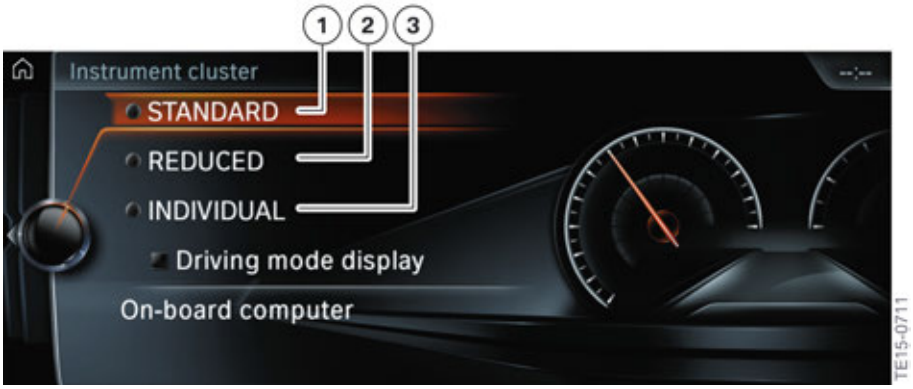
## 2.3. Features

### 2.3.1. Settings

The instrument cluster can be individually adapted by the driver by means of the controller.

**Various options are available for this purpose:**

- STANDARD
- REDUCED
- INDIVIDUAL




G12 Settings on the dynamic digital instrument display

# G12 Displays and Controls

## 2. Instrument Cluster

| Index | Explanation |
|---|---|
| 1 | STANDARD |
| 2 | REDUCED |
| 3 | INDIVIDUAL |

### STANDARD

All displays on the instrument cluster are active.


G12 dynamic digital instrument display STANDARD

### REDUCED

The displays of the instrument cluster are reduced to the essential information.


G12 dynamic digital instrument display REDUCED

### INDIVIDUAL

All displays on the instrument cluster are active. Individual displays can be configured.

# G12 Displays and Controls

## 2. Instrument Cluster

**The following displays can be configured in INDIVIDUAL mode:**

- Driving mode display
- Road sign recognition
- Magnifier function

### 2.3.2. Day/night-time mode

The instrument cluster feature automatic changeover of day/night mode.

The instrument cluster switches to night mode only when the photosensor in the instrument cluster and the rain/light sensor detect darkness and the low-beam headlights are active.


G12 dynamic digital instrument display night design

### 2.3.3. APIX

The instrument cluster is connected with to the Head Unit High 2 (HU-H2) via an APIX connection.


G12 APIX connection

| Index | Explanation |
|---|---|
| 1 | Head unit |
| 2 | Instrument panel KOMBI |

# G12 Displays and Controls

## 2. Instrument Cluster

### 2.3.4. Selection lists

Instead of the engine speed/tachometer display, it is possible to briefly display selection lists in the instrument cluster.

The following selection lists are possible:

- Navigation directions
- Audio/media
- Telephone
- Voice input


G12 Navigation display in the instrument cluster

### 2.3.5. Test functions (Service mode)

The instrument cluster in the BMW 7 Series also incorporates the known test functions as we had before. These test functions are used by BMW Service to check encoding and to read out specific vehicle values. The service mode is accessed in the same way as for other instrument clusters.

Start test functions:

- Switch on terminal 15 (press start/stop button 3 times within 0.8 s).
- Press and hold the setting button in the instrument cluster for 10 s.

# G12 Displays and Controls

## 2. Instrument Cluster

**Overview**

An overview of the test functions of the G12 is provided in the following table:

| Test functions | Description |
|---|---|
| 01 | Identification |
| 02 | System test |
| 03 | Roller test |
| 04 | Unlock test functions |
| 05 | Fuel gauge values |
| 06 | Coolant temperature, ambient temperature |
| 07 | On-board computer average values |
| 08 | Correction factor, consumption figures |

# G12 Displays and Controls

## 3. Head-Up Display

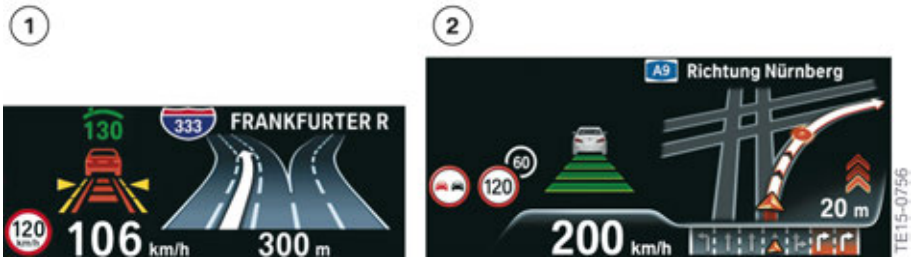
### 3.1. Introduction


G12 Head-Up Display

The full-color Head-Up Display, offered as optional equipment (SA 610) in the 740i and standard equipment in the 750i/xi G12, has a 70% larger display size than the predecessor model F01/F02. The larger display provides the platform for a new display and operating concept of the HUD. There are now new features and high-quality graphics.

# G12 Displays and Controls

## 3. Head-Up Display




G12 HUD display size comparison

| Index | Explanation |
|---|---|
| 1 | Projected image in F-series |
| 2 | Projected image in G12 |

The virtual image is visible at a distance of around 2.4 m (7.8 ft.) from the eye of the viewer.

Activation and operation of the new HUD is similar to the predecessor.

The Head-Up Display is connected to the instrument cluster via an APIX interface.

The brightness of the Head-Up Display adapts itself to the ambient brightness. This is controlled based on the data from the rain-light-solar-condensation sensor (RLSBS). The characteristic curve (image brightness in relation to the input signal from the rain-light-solar-condensation sensor) can be changed by means of the controller. In addition, the brightness in night mode can also be changed manually.

The image position and image rotation can be adjusted by means of the controller, as before.

## 3.2. Displays

### 3.2.1. Settings

**The display content of the Head-Up Display can be individually adjusted.**
**The following settings are possible:**

- STANDARD
- REDUCED
- INDIVIDUAL

# G12 Displays and Controls

## 3. Head-Up Display


G12 Head-Up Display settings

**STANDARD**

All displays of the Head-Up Display are active.

**REDUCED**

The displays of the Head-Up Display are reduced to the essential content.

**INDIVIDUAL**

All displays of the Head-Up Display are active. Individual displays can be configured.

**The following displays can be configured in INDIVIDUAL mode:**

- Entertainment/Telephone
- Navigation information
- Check Control messages
- Speed limit exceeded

### 3.2.2. Information


G12 Head-Up Display content

The various content displayed in the Head-Up Display (SA 610) is aimed at increasing road safety and ride comfort.

# G12 Displays and Controls

## 3. Head-Up Display

**This includes the following displays:**

- Welcome screen
- Assistance systems
  - Active Cruise Control Stop & Go
  - Warning if speed limit is exceeded
  - Dynamic Cruise Control
  - Traffic Jam Assistant
  - Road sign recognition
  - Proactive driving assistant
  - Speed Limit Assist
  - Night vision
  - Pedestrian warning
  - Tailgate warning
- Check Control messages
- Navigation
  - Extended turn information (animation)
  - Navigation warnings
- Lists
  - Entertainment
  - Communication
  - Voice processing system
- Driving modes
- Showroom mode

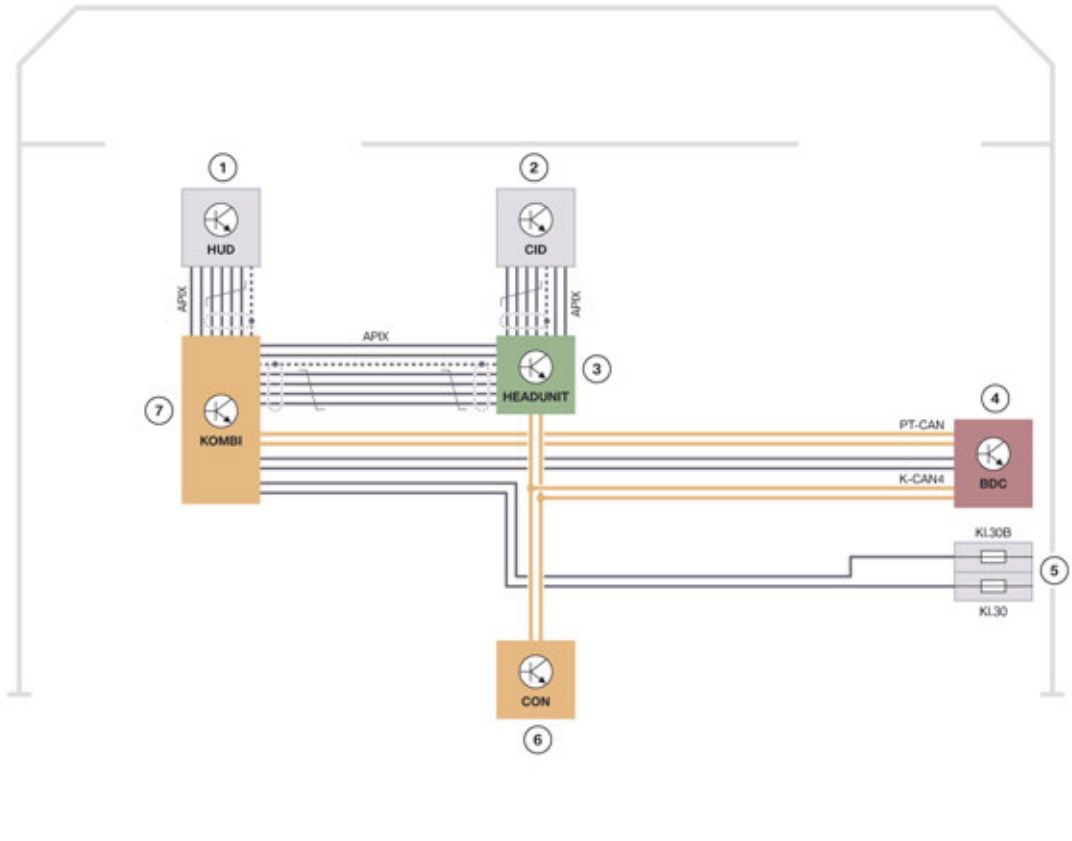
# G12 Displays and Controls

## 3. Head-Up Display


G12 Head-Up Display Check Control message


G12 Head-Up Display SPORT mode

### 3.2.3. System wiring diagram




G12 system wiring diagram of Head-Up Display

| Index | Explanation |
|---|---|
| 1 | Head-Up Display (HUD) |
| 2 | Central Information Display (CID) |
| 3 | Head unit |
| 4 | Body Domain Controller (BDC) |
| 5 | Fuses |
| 6 | Controller (CON) |
| 7 | Instrument panel (KOMBI) |

### 3.2.4. Service

**Vehicle**

The following settings can be made on the Head-Up Display in the vehicle by means of the controller:

- Head-Up Display ON/OFF
- Configuration of display content
- Height adjustment
- Display brightness
- Rotation adjustment

**Showroom Mode**

This mode demonstrates the HUD features to potential customers on the showroom floor and also allows a technician to perform this as a system test, similar to instrument cluster system test. Please note that this mode only operates with the vehicle's hood closed.

There are two methods of activating the HUD showroom mode:

- Once the Service Menu is activated, via the controller (see next "Controller" section), a new additional menu item named "Start demo" appears in the Head-Up Display menu. When "Start demo" is activated, all the displays/features in the HUD will activate.
- Access the Head-Up Display settings menu in the CID. With the check mark "on" to activate the HUD and still having it highlighted, press the Controller down 6 times (5 times if the HUD was not checked "on" originally) and the showroom mode will activate.

**Service**

Service can correct the picture geometry with the BMW workshop ISTA.

# G12 Displays and Controls

## 4. Controller

### 4.1. Overview


G12 Controller

The Controller (CON) is still the main control input for the BMW 7 Series. The controller has 7 direct access buttons as well as a touch control panel. Assignment of some direct access keys in the BMW 7 Series has been changed or is new. The following table shows the changes:

| Controller up to G12 (F-series) | Controller in G12 |
|---|---|
| RADIO and MEDIA | MEDIA |
| TEL | COM |
| NAV | NAV and MAP |
| Menu | Menu |

The functions RADIO and MEDIA are now combined in one MEDIA button. In contrast, the NAV button has now been split into a MAP button and a NAV button.

A double-press on the MENU button opens a favorites list on the Central Information Display containing the last-selected menus.

# G12 Displays and Controls
## 4. Controller


G12 Controller

### 4.1.1. Touch operation

The Touchbox (TBX) control unit has been omitted in the BMW 7 Series. The detection of character input via the touch control panel now takes place in the head unit.


G12 Head Unit High 2

# G12 Displays and Controls

## 4. Controller

### 4.2. Operation

The following table provides an overview of the direct access button functions:

| Button | Function |
|---|---|
| Menu | Press once:<br>• Main menu<br>Press twice:<br>• Favorites |
| COM | Communication |
| MEDIA | Media/Radio |
| NAV | Destination input menu |
| MAP | Navigation map |
| BACK | Previous screen |
| Option | Option menu |

#### 4.2.1. Favorites

The Favorites function is intended to provide the user easier access and operation of the last-selected menus. In order to call up the Favorites function, the MENU button on the controller must be pressed twice (double click). A maximum of the last 20 selected menus are displayed.


G12 Favorites

# G12 Displays and Controls

## 4. Controller

### 4.2.2. MAP

The navigation map is opened up directly when the MAP button on the controller is pressed. The navigation main menu, e.g. for destination input, is still called up via the NAV button.


G12 Navigation map

### 4.2.3. Service Menu

When in the service menu, it is possible to check important information details in the event of a customer complaint or a malfunction.

The service menu is also important for the BMW Service centers due to the Gracenote® data updates. In the BMW 7 Series, the service menu is accessed as follows:

You have to be in the main menu.

- Push controller forwards for at least 10 seconds
- Move controller 3 detents to the right
- Move controller 3 detents to the left
- Move controller 1 detent to the right
- Move controller 1 detent to the left
- Move controller 1 detent to the right
- Press controller once

Service menu is now added as the last submenu in the menu "My Vehicle".

There are 4 selection menus available in the service mode:

- Navigation
- Telephone and BMW Service
- TV
- Gracenote®

# G12 Displays and Controls

## 5. Central Information Display

The 12.3" Central Information Display (CID) in the G12 features touch screen operation as standard equipment and is thus an operating controller alongside the Controller. The CID has a resolution of 1440 x 540 pixels.

### 5.1. Displays

#### 5.1.1. Main menu

The user interface of the BMW 7 Series has a new design. The items are no longer arranged in a list but are now shown as graphic tiles. Among other things, this facilitates selection by touch operation.


G12 Main menu in Central Information Display

The main menu contains the following selections:

- Media/Radio
- Communication
- Navigation
- ConnectedDrive
- My Vehicle
- Notifications

The following table compares the main menu of a G12 with the main menu from the F Series vehicle. This is intended to show you what functions and applications are available in the individual menus of the new BMW 7 Series:

| Menu structure in G12 | Menu structure in F Series |
|---|---|
| Media/Radio | • Multimedia<br>• Radio |
| Communication | • Telephone<br>• Office |
| Navigation | • Navigation |

| Menu structure in G12 | Menu structure in F Series |
|---|---|
| ConnectedDrive | • ConnectedDrive |
| My Vehicle | • Vehicle info<br>• Settings |
| Notifications | • Office<br>• Vehicle info |

### 5.1.2. My Vehicle

The "My Vehicle" menu combines the previous menus "Vehicle info" and "Settings" and is divided up into the 2 large submenus “Vehicle settings” and “System settings”.

### 5.1.3. Personalize menu

The customer can configure some of the menus due to the large number of new functions and applications. This submenu "Personalize menu" allows lists to be personalized to that the customer has a better overview. This allows the customer to configure his radio list, for example, so that no AM stations are offered for selection. The settings can be cancelled again at any time.

The following menus have this “Personalize” feature:

- Media/Radio
- Communication
- ConnectedDrive

### 5.1.4. Split screen

It is still possible to display a split screen in the CID. Selection of the content is made easier for the user by having a graphic preview. There is new navigation content available for the split screen. Further information about this is provided in the technical training manual “ST1501 G12 Navigation systems”.

# G12 Displays and Controls

## 5. Central Information Display


G12 Split screen in the Central Information Display

### 5.1.5. Preview

In most menus, a preview of the settings and applications in the currently selected menu is displayed on the right-hand side of the screen. This makes navigation in the menus easier for the user due to reduced selection of incorrect menus.

The bottom graphic shows the language selection by way of example. On the right side it is immediately possible to see which languages are available for selection.

# G12 Displays and Controls

## 5. Central Information Display


G12 CID display preview

| Index | Explanation |
|---|---|
| 1 | Language selection |
| 2 | Preview of the possible languages |

### 5.1.6. Screensaver

A screensaver can be activated in the BMW 7 Series. This is activated only when no menus are open, i.e. the main menu must be currently displayed.

The time until the screensaver is displayed can be set individually to 30, 60 or 120 seconds or the screensaver can be switched off completely.


G12 Screensaver

The content of the screensaver cannot be changed.

# G12 Displays and Controls

## 5. Central Information Display

### 5.1.7. Profiles

If a name is assigned to the personal profile, this entered name will be shown as a personal welcome as an animation on the central information display when the customer enters and starts the vehicle.


G12 Welcome display

## 5.2. Touch operation

Touch operation of the CID is included as standard equipment in the BMW 7 Series.

The displays of the Rear Seat Entertainment are **not** equipped with touch operation. The optional equipment Rear Seat Entertainment is controlled either via a remote control or via the BMW Touch Command (SA 6U9).

### 5.2.1. Detection

To allow easier operation of the touch control function, the graphic symbols in the main menu increase in size when a hand/finger is moved closer to the symbol. The list entries of the individual menus are also specially highlighted to facilitate operation.

Infrared sensors are installed on the left and right of the CID housing for detection of an approaching hand.

# G12 Displays and Controls

## 5. Central Information Display


G12 CID including infrared LEDs

### Keypad letters

The input changed from the previous circular input of the controller to a keypad for input of letters, e.g. for destination input.


G12 Display for CID touch input

### Telephone keypad

A keypad is also displayed when a hand approaches the CID for input of digits, e.g. a phone number.

# G12 Displays and Controls

## 5. Central Information Display


G12 Telephone touch input

The touch control panel must be touched only with fingers and not with objects.

### 5.2.2. Main menu

It is possible to return to the main menu by means of the house symbol in the top left corner. This is equivalent to the MENU button of the controller. The Favorites view is opened if the button is pressed twice.


G12 Main menu for touch operation

# G12 Displays and Controls

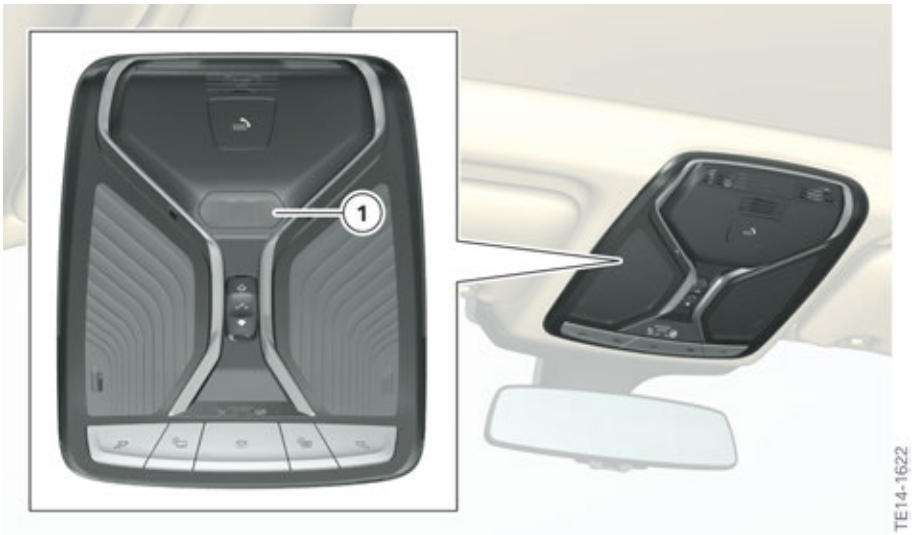
## 6. Gesture Control

For the first time, there is function controllability by the use of gesture control (SA 6U8) in the G12.

Individual functions, such as input of the home address in route guidance, can be carried out conveniently by means of a directed movement between the gear selector switch and instrument panel.

### 6.1. Camera

The gesture recognition camera is a TOF (Time of Flight) camera which is integrated in the roof function center (FZD).




Roof function center (FZD) with gesture recognition camera

| Index | Explanation |
|---|---|
| 1 | Gesture recognition camera |

#### 6.1.1. Overview

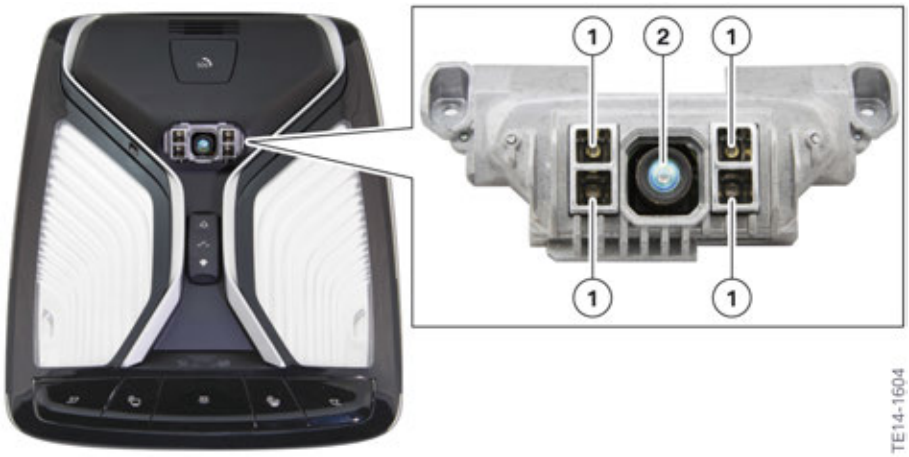
TOF cameras have an extremely high level of detection sensitivity and are therefore highly suitable for gesture recognition and control.

A TOF camera operates with similar principles as of a radar or echo sounder, which sends out signals and is then able to detect their reflections in the surrounding area. With this kind of camera, light wavefronts are transmitted into space and the time required for the light to return at this point is measured for each sensor pixel. This time measurement is performed based on the "Time of Flight" principle.

Pulse modulation is used for the gesture recognition of the G12. With pulse modulation, a short light pulse is emitted and a time measurement is started simultaneously.

# G12 Displays and Controls

## 6. Gesture Control




G12 Gesture recognition camera

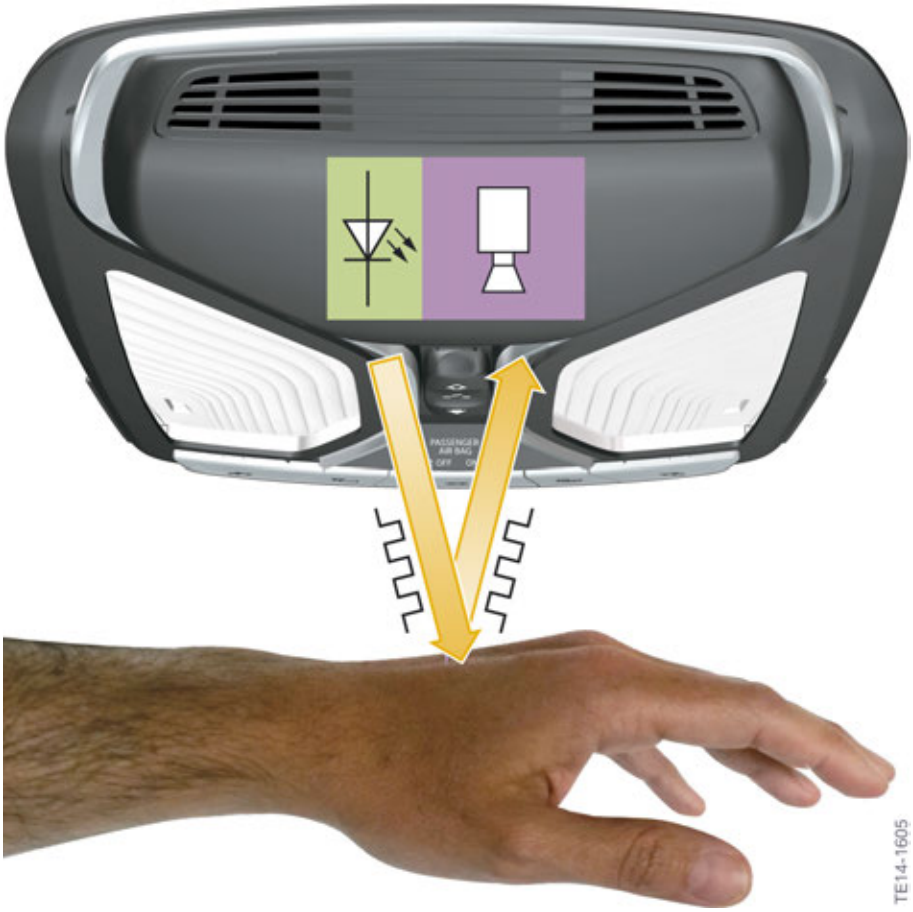
| Index | Explanation |
|---|---|
| 1 | Infrared LEDs |
| 2 | Camera |

### 6.1.2. Function

Four (4) infrared LEDs (like those in a TV remote control) illuminate the gesture interaction space in a pulsed mode. The gesture recognition camera “sees” the reflected light in the illuminated area and calculates the distance by measuring the time-of-flight of the light signal between the camera and the reflecting object. This technique is used to generate the 3D image which is required for gesture recognition.

# G12 Displays and Controls

## 6. Gesture Control




G12 Function of gesture recognition camera

The following graphic shows an image which has been recorded by the gesture recognition camera. It is clear to see that a hand is performing a gesture.


G12 View from the gesture recognition camera

# G12 Displays and Controls

## 6. Gesture Control

### 6.1.3. Detection range

The detection range of the gesture recognition camera extends from part of the steering wheel to part of the glove box.


G12 Detection range of the gesture recognition camera

⚠

Do not look directly into the infrared LEDs from a short distance (< 7 cm/2.75 in).
This can damage the eyes.

# G12 Displays and Controls

## 6. Gesture Control

### 6.2. Operation

The gesture control can be switched on or off and can also be personalized by means of the controller.


G12 Settings for gesture control

#### 6.2.1. Settings

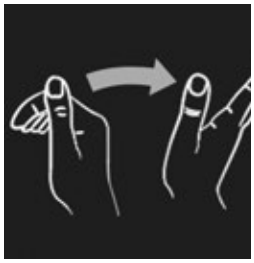
| Setting | Explanation |
|---|---|
| "Display tips" | The possible gesture is shown on the control display. |
| "Audio feedback" | An acoustic signal is output when a gesture is detected. |

# G12 Displays and Controls

## 6. Gesture Control

### 6.2.2. Possible gestures

The gestures selection was restricted in order to guarantee reliable gesture detection and thus good customer acceptance.

| Gesture | Operation | Function |
|---|---|---|
|  | Move index finger to and fro in direction of control display CID screen. | • Accept telephone call<br>• Confirm Check Control message |
|  | Move hand over the width of the control display CID in the direction of the passenger's side. | • Reject telephone call<br>• Close pop-up |
|  | Move hand slowly in circular clockwise movement with index finger extended forward. Gesture is recognized after approximately one circular movement. | • Increase volume |

# G12 Displays and Controls

## 6. Gesture Control

| Gesture | Operation | Function |
|---|---|---|
|  | Move hand slowly in circular anti-clockwise movement with index finger extended forward. Gesture is recognized after approximately one circular movement. | • Reduce volume |
|  | Grip thumb and index finger together and move hand horizontally right or left. | • Surround View: Rotate camera view |
|  | Extend index and middle fingers forward. | • Individually assignable gesture |

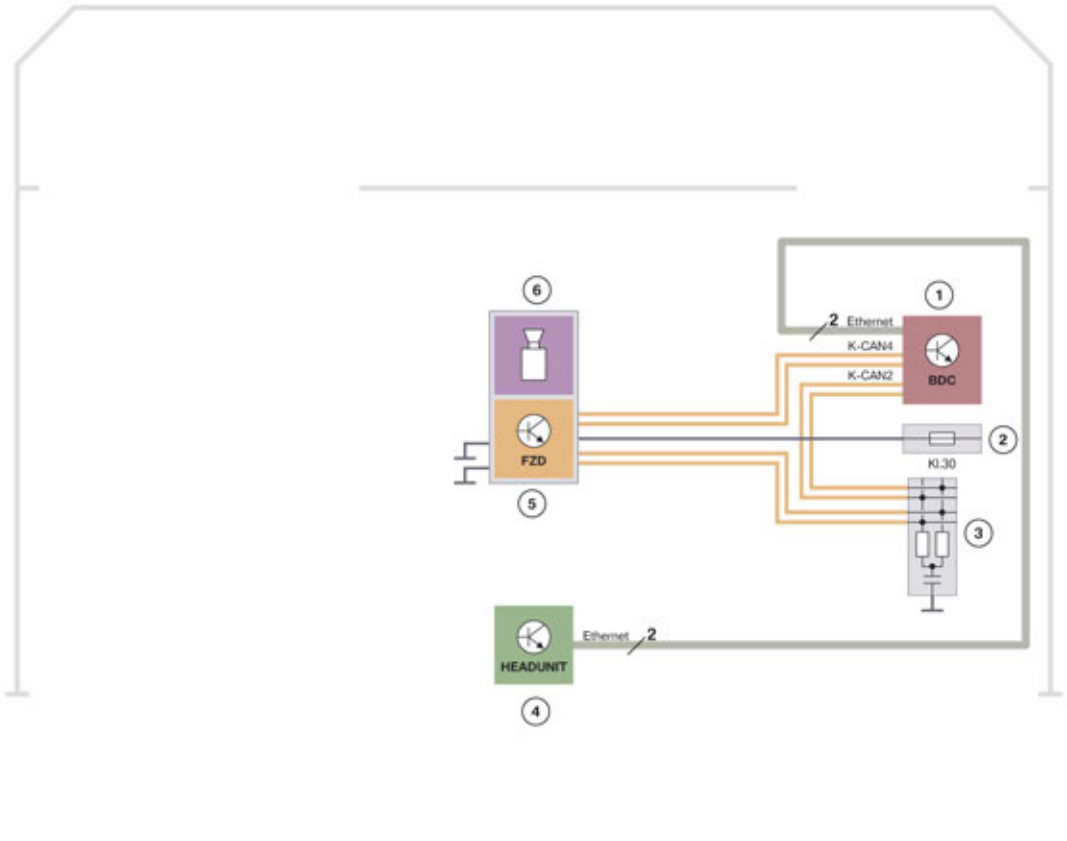
**The following functions can be assigned to the individually assignable gesture:**

- Guidance to home address
- Mute/Unmute
- Last used menus
- Next track/station
- Recent calls
- Notifications
- Turn off control display

# G12 Displays and Controls

## 6. Gesture Control

### 6.2.3. System wiring diagram




G12 System wiring diagram of gesture recognition camera

| Index | Explanation |
|---|---|
| 1 | Body Domain Controller (BDC) |
| 2 | Fuse |
| 3 | CAN terminator |
| 4 | HEADUNIT |
| 5 | Roof function center (FZD) |
| 6 | Gesture recognition camera |

The detected gestures are sent by the roof function center (FZD) to the BDC. This forwards the data to the head unit via an OABR (Open Alliance BroadR-Reach) Ethernet connection, which is only 2 wires.

### 6.2.4. Limits of the system

There may be problems with gesture recognition in certain circumstances.
Several examples of this are shown below:

- The camera lens is covered
- The camera lens is dirty
- The gesture is performed outside the detection range
- Wearing gloves or jewelry
- Smoking inside the vehicle

# G12 Displays and Controls
# 7. Multifunction Steering Wheel

In the BMW 7 Series, many functions can still be controlled via the multifunction steering wheel buttons. The arrangement on the steering wheel itself remains unchanged. Some of the assistance systems are operated on the left side of the steering wheel and the multimedia functions on the right.

## 7.1. Variants

### 7.1.1. Assistance systems

Depending on equipment, the BMW 7 Series is fitted with different button configurations on the multifunction steering wheel. These are shown to you in the following table:

| Equipment | Multifunction buttons |
|---|---|
| Standard equipment<br>• Dynamic Cruise Control |  |
| Driving Assistant Plus (SA 5AT)<br>• ACC Stop&Go<br>• Steering and lane control assistant |  |

# G12 Displays and Controls

## 7. Multifunction Steering Wheel

### 7.1.2. Multimedia

The following graphic provides an overview of the buttons for multimedia applications on the multifunction steering wheel.


G12 Multimedia on multifunction steering wheel

| Index | Explanation |
|---|---|
| 1 | Entertainment source |
| 2 | Increase volume |
| 3 | Reduce volume |
| 4 | Voice processing system |
| 5 | Telephone |
| 6 | Knurled wheel for selection lists |

# G12 Displays and Controls

## 8. BMW Touch Command

### 8.1. Overview

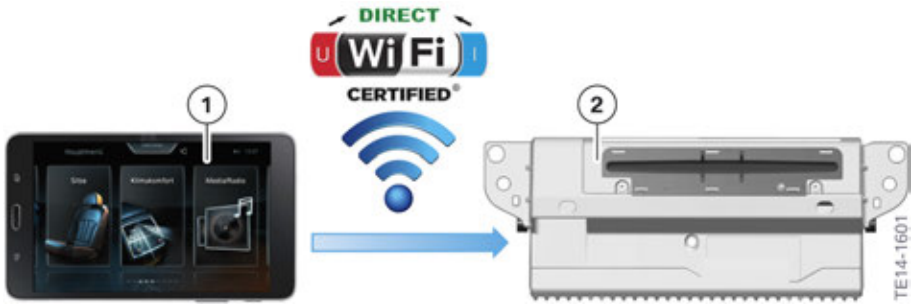
The new function controller BMW Touch Command (SA 6U9) is used for the first time in the G12. The removable tablet PC does not just replace the rear compartment controller, but also includes a host of new functions, which area divided up into the 3 main menus "Comfort", "RSE Remote", and "Web + App applications".

The BMW Touch Command is based on a 7" Samsung® tablet, which runs on an Android® operating system.


G12 BMW Touch Command in the rear passenger compartment

### 8.2. Connection

The BMW Touch Command is connected to the head unit via the vehicle Wi-Fi® (Wi-Fi Direct®). The head unit functions as a gateway for the commands transmitted by the BMW Touch Command.




G12 Connection of BMW Touch Command via Wi-Fi Direct®

# G12 Displays and Controls

## 8. BMW Touch Command

| Index | Explanation |
|---|---|
| 1 | BMW Touch Command |
| 2 | Head unit |

Further information on the Wi-Fi connection between the BMW Touch Command and the head unit is provided in the technical training manual “ST1501 G12 Information and Communication".

## 8.3. Operation

In the BMW 7 Series, the BMW Touch Command features a user interface which has been adapted to the BMW applications for greater ease of use . The user has a conventional tablet available which is equipped with an Android™ operating system. In order to use it as such, the user must exit the BMW interface by means of the "App" application.

### 8.3.1. Seats

#### Seat adjustment

The seat adjustment function allows adjustment of the rear seats as well as the Captain's Chair, available as optional equipment (included in the optional equipment “Executive Lounge Seating” (SA 7GZ)).


G12 BMW Touch Command seats

- Backrest adjustment
- Head restraint height adjustment
- Footrest angle
- Sleeping position
- Lumbar support
- Reset
- Memory function for rear passenger compartment and front passenger seat
- Rear monitor adjustment

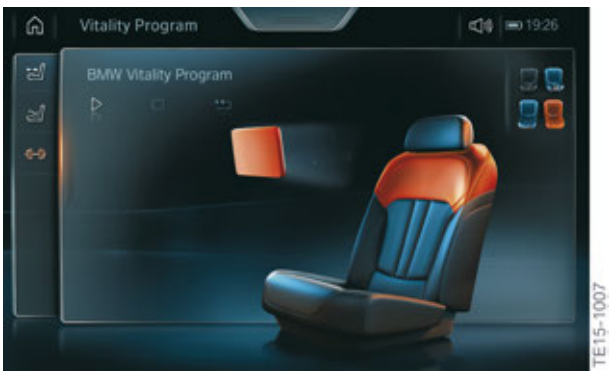
# G12 Displays and Controls
## 8. BMW Touch Command

### Seat massage


G12 Massage using BMW Touch Command

- Hip activation
- Upper body activation
- Whole body activation
- Back massage
- Shoulder massage
- Lumbar massage
- Upper body training
- Whole body training

### BMW Vitality Program




G12 BMW Touch Command BMW Vitality Programme

- BMW Vitality Program

# G12 Displays and Controls

## 8. BMW Touch Command

### 8.3.2. Climate comfort

#### Rear climate


G12 BMW Touch Command heating and air conditioning system

- Heating and air conditioning system in rear passenger compartment
- Seat heating, including armrests
- Seat heating distribution
- Seat ventilation

#### Fragrance


G12 BMW Touch Command fragrance

- Fragrance
- Fragrance selection
- Intensity

# G12 Displays and Controls
## 8. BMW Touch Command

**Ionization**


G12 BMW Touch Command ionization

- Switching ionization on/off

### 8.3.3. Interior lighting

**Interior lighting**


G12 BMW Touch Command interior lighting

- Switching lighting on/off
- Brightness
- Color

# G12 Displays and Controls
## 8. BMW Touch Command

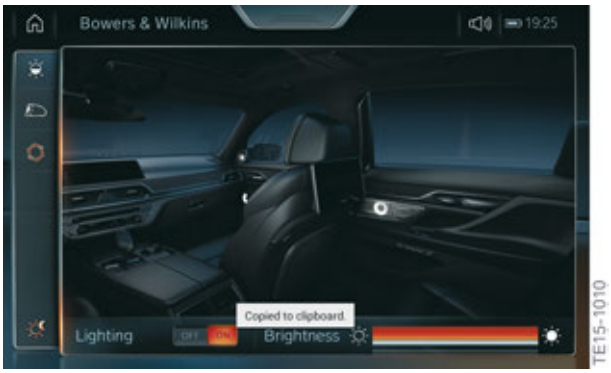
**Rear accent lighting (light saber)**

This menu controls the light saber, which is located in the B-pillar.

G12 BMW Touch Command rear accent lighting

- Switching accent lighting on/off
- Brightness

**Bowers & Wilkins**

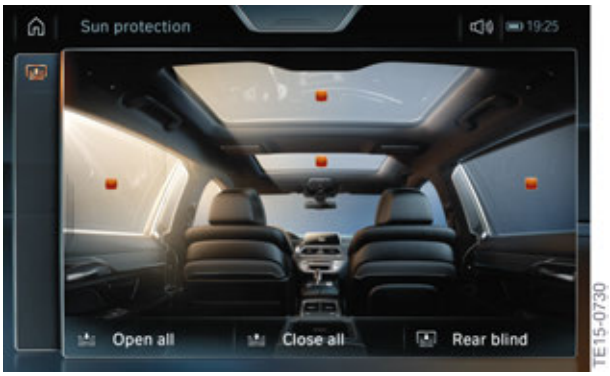


G12 BMW Touch Command Bowers & Wilkins

- Switching lighting on/off
- Brightness

# G12 Displays and Controls
## 8. BMW Touch Command

### 8.3.4. Sun protection



G12 BMW Touch Command sun protection

- Window blinds
- Rear window blind
- Panorama glass roof blind

### 8.3.5. Media/Radio

G12 BMW Touch Command Entertainment

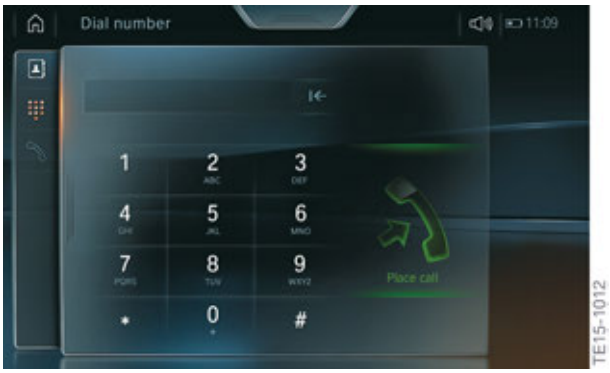
The following functions can be controlled in the Media/Radio menu:

- Radio
- CD/DVD/Blu-ray
- Bluetooth audio streaming
- AUX In
- USB
- Music collection
- Tone settings
- TV

# G12 Displays and Controls

## 8. BMW Touch Command

### 8.3.6. Rear compartment telephone




G12 BMW Touch Command telephone

- Rear compartment telephone contacts
- Start/end call
- Dial number

### 8.3.7. Driving info


G12 BMW Touch Command navigation

- Arrival time
- Fuel consumption
- Range
- Compass

# G12 Displays and Controls
## 8. BMW Touch Command

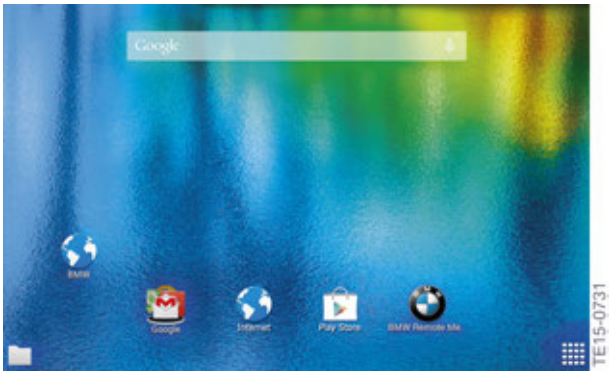
### 8.3.8. Settings


G12 BMW Touch Command settings

The following settings can be made via this menu on the BMW Touch Command.

- Display
- Sound
- Display tips
- Information on device
- Reset

### 8.3.9. Apps




G12 BMW Touch Command Apps

The BMW-specific application is exited with the menu item “Apps”. The BMW Touch Command can then be used like a normal tablet.

The BMW user interface is called up by pressing the "Home" button.

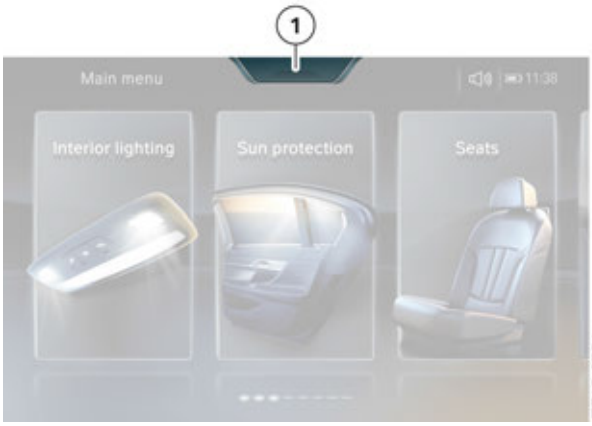
Further information on the BMW Touch Command and on the update process is provided in the technical training manual “ ST1501 G12 Information and Communication”.

# G12 Displays and Controls

## 8. BMW Touch Command

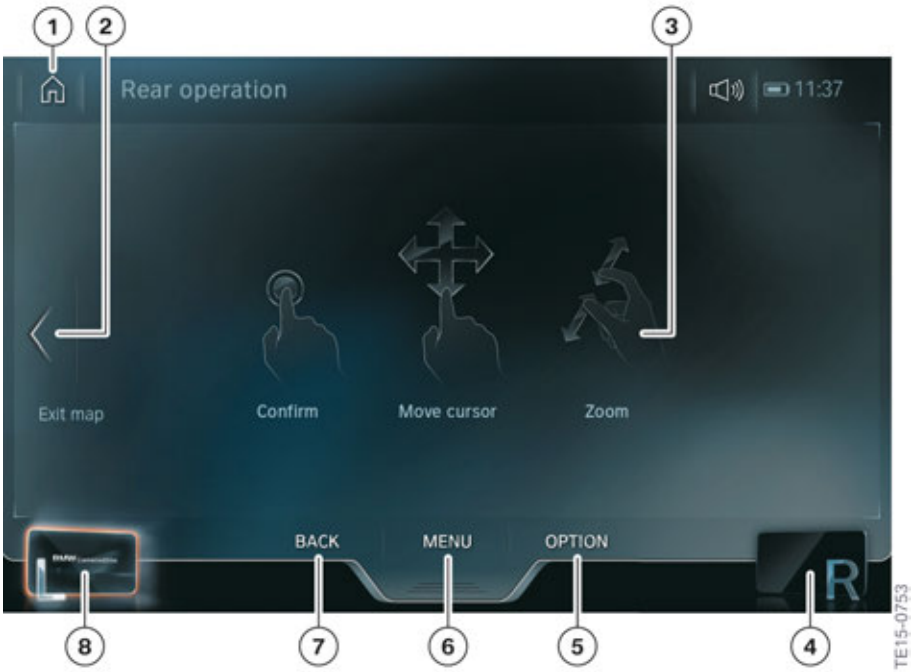
### 8.3.10. Rear Seat Entertainment control

The Rear Seat Entertainment (RSE) is controlled using the BMW Touch Command. In order to start the operation function, it is necessary to pull down the additional window (see graphics below).




G12 RSE control

| Index | Explanation |
|---|---|
| 1 | Additional window for controlling the Rear Seat Entertainment (RSE) |




G12 RSE control via BMW Touch Command

# G12 Displays and Controls
## 8. BMW Touch Command

| Index | Explanation |
|---|---|
| 1 | Main menu |
| 2 | Exit |
| 3 | Touch operation area |
| 4 | Right rear compartment display |
| 5 | Options |
| 6 | Menu |
| 7 | Back |
| 8 | Left rear compartment display |

## 8.4. Snap-in adapter

The snap-in adapter holds the BMW Touch Command in position. For this purpose, there is a drive in the snap-in adapter which opens and closes the two retaining claws. The BMW Touch Command is also charged via the snap-in adapter.

There are 3 hall effect sensors in the snap-in adapter that detect whether or not the BMW Touch Command is inserted in the correct position and with the display facing up. For this purpose, a shell with 3 magnets is secured onto the rear of the BMW Touch Command.

If the snap-in adapter is replaced, the installation position of the BMW Touch Command must be taught in with the BMW workshop ISTA.

### 8.4.1. Charging

If the BMW Touch Command is not inserted correctly, the LED on the release button will flash. It will be automatically locked into position, but will not be charged.

The snap-in adapter is controlled by the Light Effect Manager (LEM) via a LIN-bus. The LEM functions include:

- Release and locking
- Lighting
- Charging conditions

**The BMW Touch Command is charged under the following conditions:**

- Charging takes place continuously in the vehicle condition - Driving.
- In the vehicle condition status - Residing, charging takes place as soon as the battery state of charge falls below 20% (engine off, vehicle not locked and remote key not in the vehicle).
- The BMW Touch Command is not charged in the vehicle condition - Parking.

# G12 Displays and Controls

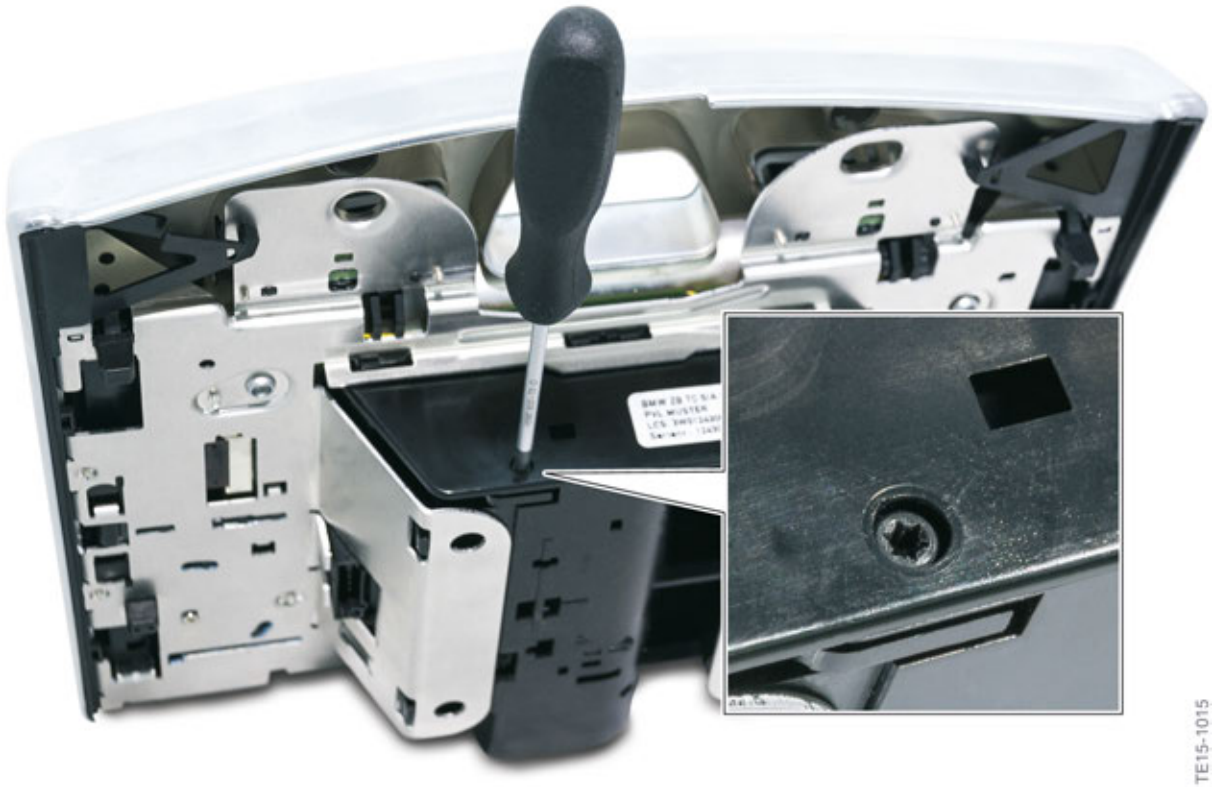
## 8. BMW Touch Command

### 8.5. Service

Release and charging of the BMW Touch Command is deactivated in transport mode.

When a vehicle is locked (Parking status), the release button does not function for reasons of theft protection. The same applies when the vehicle is open and there is no remote key in the vehicle.

If the BMW Touch Command can no longer be removed from the snap-in adapter due to a technical fault, an emergency release function is available.




G12 Emergency release of BMW Touch Command

For further information, refer to the repair instructions in the BMW workshop ISTA.

# G12 Displays and Controls
# 9. Driving Experience Switch

The driving experience switch allows the driver to influence the driving characteristics of the vehicle without having to know exactly what systems are involved. The different modes affect the entire vehicle and permit a large number of settings depending on the vehicle equipment.

## 9.1. Overview

An overview of the systems that are influenced is provided below:

- Engine
- Automatic transmission
- Dynamic Damper Control
- Air suspension
- Dynamic Drive
- Integral Active Steering
- Display in the instrument cluster
- Cruise control

## 9.2. Modes

The modes are divided up into the main modes (driving modes) and the corresponding sub-modes (configuration menus), which offer the driver additional adjustment options.

# G12 Displays and Controls

## 9. Driving Experience Switch


G12 Main and sub modes

| Index | Explanation |
|---|---|
| 1 | Driving experience switch |
| 2 | STANDARD |
| 3 | COMFORT PLUS |
| 4 | INDIVIDUAL |
| 5 | ADAPTIVE |

The driver can use the driving experience switch to directly select different driving modes which alter various properties of the vehicle depending on the vehicle's equipment specification.

# G12 Displays and Controls

## 9. Driving Experience Switch

In addition to the already familiar main modes (driving modes) “COMFORT“, “SPORT“ and “ECO PRO“ mode, the BMW 7 Series now also has an “ADAPTIVE“ mode.

The driving modes currently selected by the driver are displayed in the instrument cluster.


G12 driving experience switch

### 9.3. COMFORT

The “COMFORT“ mode is a comfort-oriented setup and offers a harmonious combination of dynamic and fuel-efficient driving. The vehicle is always in "COMFORT" mode after driving readiness has been established.

#### 9.3.1. STANDARD

The STANDARD setting comprises the factory settings or basic settings.


G12 COMFORT

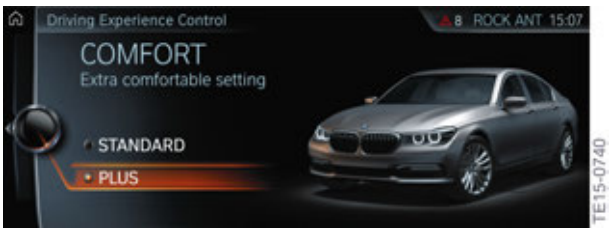
# G12 Displays and Controls
## 9. Driving Experience Switch

### 9.3.2. PLUS

In the sub-mode (configuration menu), the customer has the possibility of influencing ride comfort, among other things.

“COMFORT PLUS“ mode is a comfortable setup that ensures optimum journey comfort. The setting parameters are fixed values. For this reason, further personalization is not possible for "COMFORT PLUS" mode.

In "COMFORT PLUS" mode, the engine and automatic transmission are switched to very comfortable characteristics and damper control to a soft setup. Driving off takes place in 2nd gear in this setting.



G12 COMFORT PLUS

## 9.4. SPORT

"SPORT" mode can be experienced in the vehicle through a large number of different functions and properly adapted features. The chassis and drive are connected directly with reduced comfort, thereby increasing the vehicle response to driver input.

The drive and chassis components are set to a sporty setup. The self-levelling suspension of the 2-axle air suspension also allows the vehicle body to be lowered by 10 mm.

In addition to the driving dynamics, the assistance systems, such as cruise control, are also switched to a sporty setting.

The sporty experience is further enhanced by visual means, with a sporty representation in the Central Information Display (CID) and in the instrument cluster.

The Active Sound Design (ASD) further emphasizes the sportier driving experience.

### 9.4.1. STANDARD

The STANDARD setting comprises the factory settings or basic settings.

G12 SPORT STANDARD

# G12 Displays and Controls
## 9. Driving Experience Switch

### 9.4.2. INDIVIDUAL

The sub-mode (configuration menu) allows the customer to configure or personalize various functions according to his/hers personal taste.

**The list below shows which systems can be influenced:**

- Damping
- Steering
- Engine
- Transmission


G12 SPORT INDIVIDUAL

## 9.5. ECO PRO

The "ECO PRO" mode supports the driver in adopting an optimized-consumption driving style and reduces fuel consumption through intelligent control of energy and A/C management.

Among other things, the accelerator pedal characteristic and the shift program of the automatic transmission are changed in order to permit a fuel-efficient driving style.

In addition to the corresponding setup of the drive train, the driver is provided with additional assistance in the form of ECO PRO functions like the proactive driving assistant and idle coasting for a fuel-efficient driving style, as well as additional display features.

### 9.5.1. STANDARD

The STANDARD setting comprises the factory settings or basic settings.


G12 ECO PRO Standard

# G12 Displays and Controls
## 9. Driving Experience Switch

### 9.5.2. INDIVIDUAL

The sub-mode (configuration menu) allows the customer to configure or personalize various functions according to his personal taste.

**The list below shows which systems can be influenced:**

**ECO PRO information:**

- ECO PRO tips
- ECO PRO limit

**ECO PRO functions:**

- Coasting
- ECO PRO climate control
- ECO PRO light and sight
- Proactive driving assistant

**Driving dynamics:**

- Damping
- Steering

G12 ECO PRO INDIVIDUAL

## 9.6. ADAPTIVE

G12 ADAPTIVE mode

# G12 Displays and Controls
## 9. Driving Experience Switch

### 9.6.1. Overview

The "ADAPTIVE" mode is used for the first time in the BMW 7 Series. It is designed to achieve a balanced driving mode where the setup is automatically adapted to both the driving situation and the driving style.

In this mode, the parameters of the Electronic Damper Control (VDP), the Electric Active Roll Stabilization (EARS), Electronic Power Steering (EPS) and the automatic transmission, for example, are switched between "COMFORT", "SPORT" and “ECO PRO” settings depending on the driving situation. However, when "ADAPTIVE" mode is active, no changes that restrict comfort (seat heating, A/C settings, etc.) are made in the event of switching to "ECO PRO" mode.

"ADAPTIVE" reacts to the current driving style. The affected control units can change their parameters on the basis of the detected driving style.

With the navigation system, the mode makes use of the available map data and optimizes "ADAPTIVE" mode by predictive functions such as early reaction to bends, junctions and road type.

The displays on the instrument cluster and Central Information Display (CID) remain in "normal" mode and do not continuously change between "COMFORT" and "SPORT" modes. This is to prevent the driver from being distracted or lose comfort by changes in the displays. "ADAPTIVE" mode changes the modes in the background so that the driver does not notice the changes directly.

**The following influences on the driving style are taken into account, among others:**

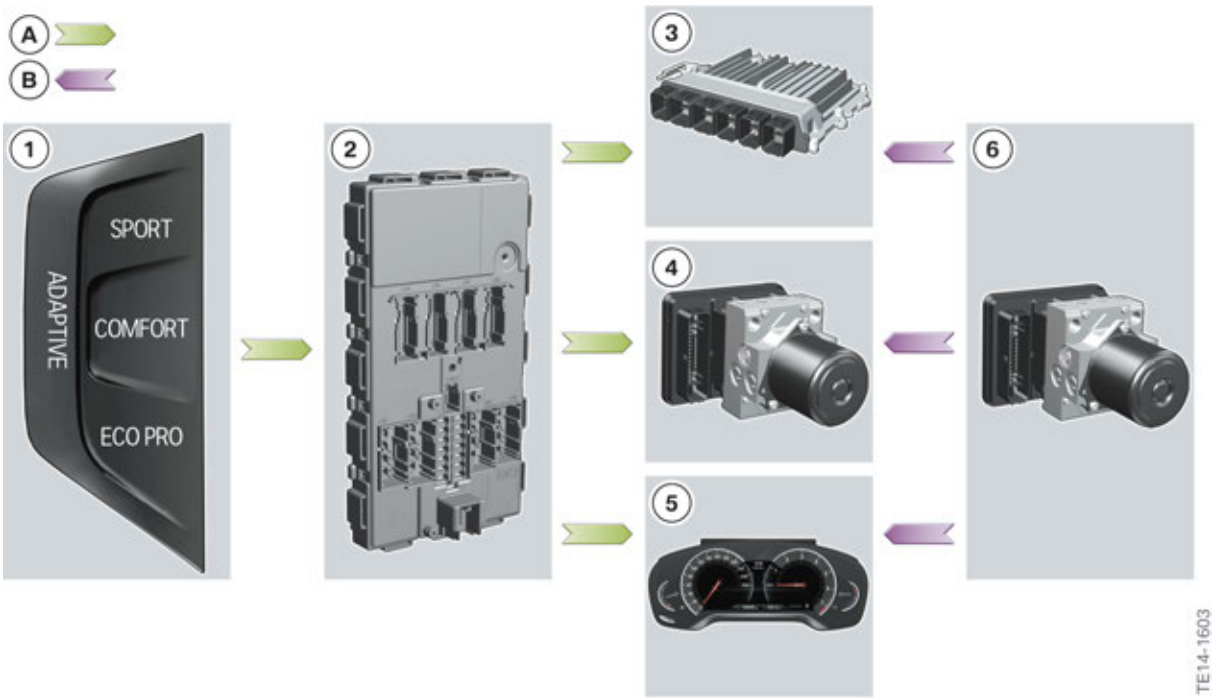
- Longitudinal dynamics
- Current speed
- Pedal sensor position
- Cruise control (sensor data from ACC radar sensor)
- Sport shift gate for automatic transmission
- Turn indicator
- Steering wheel movements
- Navigation data

# G12 Displays and Controls

## 9. Driving Experience Switch

### 9.6.2. Function

If a driving mode is changed by means of the driving experience switch, this data is sent from the Body Domain Controller (BDC) to the responsible control units. The parameter changes in "ADAPTIVE" mode are sent by the Dynamic Stability Control (DSC) to the responsible control units.




Input and output components for Adaptive mode

| Index | Explanation |
|---|---|
| A | Setting via driving experience switch |
| B | Setting via "ADAPTIVE" mode |
| 1 | Driving experience switch |
| 2 | Body Domain Controller (BDC) |
| 3 | Digital Motor Electronics (DME), drive functions |
| 4 | Dynamic Stability Control (DSC), input signals of the adaptive logic |
| 5 | Instrument cluster (KOMBI), display functions |
| 6 | Dynamic Stability Control (DSC), driving dynamics functions |

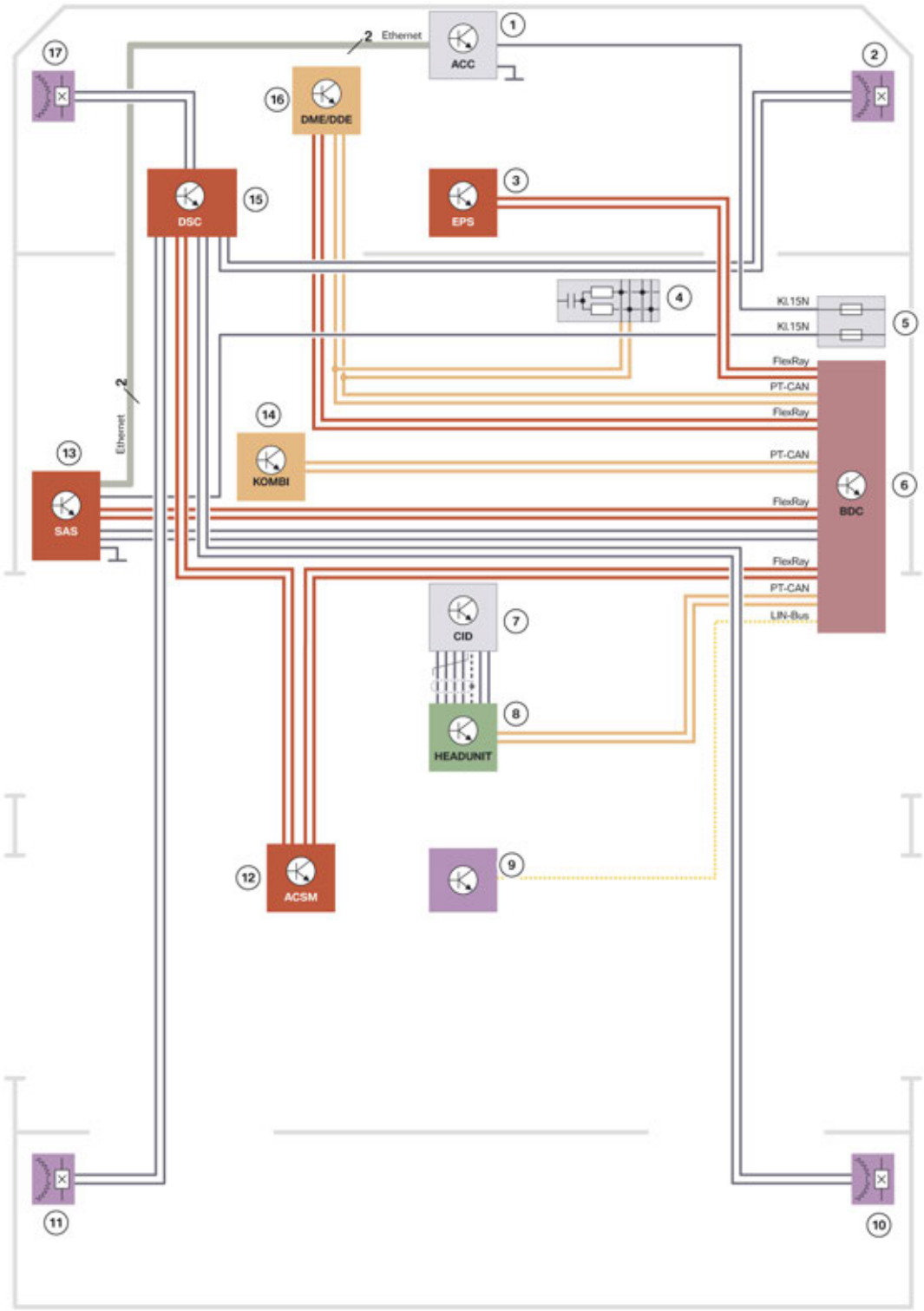
If the navigation system detects a town, a mixture of the "COMFORT PLUS" and "ECO PRO" modes is activated in order to support a comfortable and fuel-efficient driving style.

The acoustics are correspondingly changed by the Active Sound Design (ASD).

# G12 Displays and Controls

## 9. Driving Experience Switch

### 9.6.3. System wiring diagram




G12 System wiring diagram of driving experience switch

# G12 Displays and Controls

## 9. Driving Experience Switch

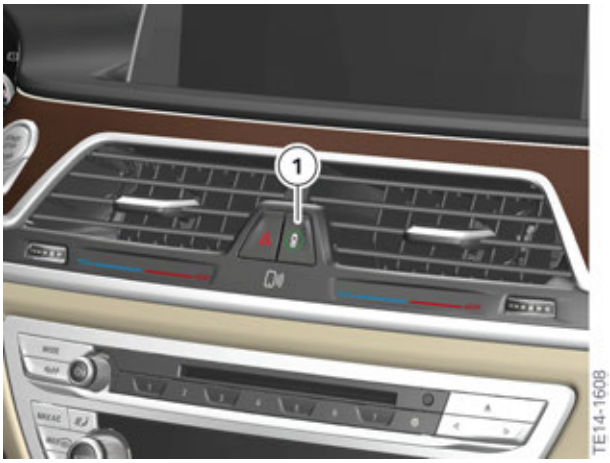
| Index | Explanation |
|---|---|
| 1 | Active Cruise Control (ACC) |
| 2 | Wheel-speed sensor, front right |
| 3 | Electronic Power Steering (electromechanical power steering) (EPS) |
| 4 | CAN terminator |
| 5 | Fuses in the power distribution box, front right |
| 6 | Body Domain Controller (BDC) |
| 7 | Central Information Display (CID) |
| 8 | Head unit |
| 9 | Driving experience switch |
| 10 | Wheel speed sensor, rear right |
| 11 | Wheel speed sensor, rear left |
| 12 | Advanced Crash Safety Module (ACSM) |
| 13 | Optional equipment system (SAS) |
| 14 | Instrument panel (KOMBI) |
| 15 | Dynamic Stability Control (DSC) |
| 16 | Digital Motor Electronics (DME) |
| 17 | Wheel-speed sensor, front left |

# G12 Displays and Controls

## 10. Intelligent Safety Button

### 10.1. Overview

The Intelligent Safety button permits central operation of certain assistance systems.
The systems can be switched on or off and can be personalized.




G12 Intelligent Safety button

| Index | Explanation |
|---|---|
| 1 | Intelligent Safety button |

### 10.2. Settings

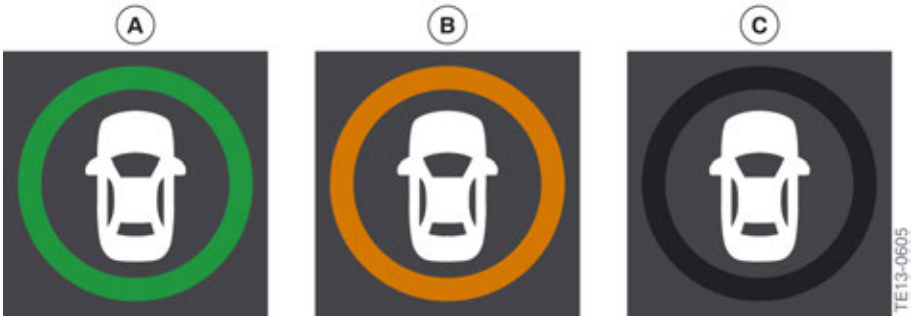
The following assistance systems can be operated by means of the Intelligent Safety button:

- Collision warning with braking function
- Pedestrian warning with city braking function
- Night Vision with person and animal recognition
- Lane departure warning
- Blind spot detection
- Side collision warning

# G12 Displays and Controls

## 10. Intelligent Safety Button

### 10.3. Displays




G12 Intelligent Safety button displays

| Index | Explanation |
|---|---|
| A | All Intelligent Safety systems are switched on |
| B | Some Intelligent Safety systems are switched off or sub-function settings have been changed |
| C | All Intelligent Safety systems are switched off |

# G12 Displays and Controls

# 11. Remote Key

## 11.1. Overview

The G12 is supplied with 2 remote keys as the standard equipment configuration.

Each remote key has a replaceable battery. Depending on the vehicle equipment the customer can configure various functions for each remote key.

A Display key (SA 3DS) is available as optional equipment.

## 11.2. Emergency detection

If there are transmission problems between the transponder of the remote key and the vehicle where it is not possible to establish driving readiness, an "emergency detection function" is available. The customer is informed about the fact that the remote key has not been detected by means of a Check Control message.

If a corresponding Check Control message is displayed, the remote key must be held against the marking on the steering column. The start/stop button must then be pressed immediately after this (within a time of around 10 s) with the brake pedal depressed.


Emergency detection of the remote key

This function allows driving readiness to be established if the battery of the remote key is exhausted, for example.

The emergency detection function is possible both for the remote key and for the Display key.

The transponder of the Display key is located on the rear side at around the level of the lock button (BMW badge).

# G12 Displays and Controls

## 11. Remote Key

### 11.3. Display key

The Display key (SA 3DS) offered as optional equipment in the G12 replaces a standard remote key.

The Display key combines the remote key, the ID transmitter, and a touch display in one key.

The display is a 2.2" LCD color display with a resolution of 320 x 240 pixels.
The display is operated by means of swipe and touch gestures.

#### 11.3.1. Operation


Display key

| Index | Explanation |
|---|---|
| 1 | Open tailgate |
| 2 | Unlocking |
| 3 | Locking |
| 4 | Panic button |
| 5 | Display |
| 6 | Back |
| 7 | Switch display on/off |
| 8 | Micro USB charging port |

# G12 Displays and Controls

## 11. Remote Key

Instead of a standard remote key, the delivery specification of the BMW Display key includes an additional mechanical key. The mechanical key should be carried as well if the Display key is used.

### 11.3.2. Function

The Display key supports all functions of the standard remote key, but does not have an integrated mechanical key.

The key also permits status information on various functions to be accessed. The customer has the possibility of obtaining information on his vehicle, e.g. the range.

Certain settings of the vehicle are adopted by the Display key, e.g. date and time format, language or units. Up to 27 languages can be displayed on the Display key.

In the key, the menus are divided up into 4 main menus. These are in turn divided into further submenus.

**Security information**


G12 Security display

| Index | Explanation |
|---|---|
| 1 | Main menu for vehicle and window status |
| 2 | Submenu; status of windows, doors, tailgate, alarm system |

# G12 Displays and Controls

## 11. Remote Key

### Climate settings


G12 Climate display

| Index | Explanation |
|---|---|
| 1 | Climate control status |
| 2 | Climate control setting or immediate activation |
| 3 | Set time |

# G12 Displays and Controls

## 11. Remote Key

### Vehicle information


G12 Service display

| Index | Explanation |
|---|---|
| 1 | Main menu for vehicle information |
| 2 | Submenu; Service requirements or lighting status |

# G12 Displays and Controls

## 11. Remote Key

### Range information


G12 Range display (range status)

### Range

All key functions are available in a radius of approximately 50 m around the vehicle. The further away the key is from the vehicle, the fewer functions that are available. The following table illustrates this in more detail:

| Functions | Close reception range | Extended reception range | Outside the reception range |
|---|---|---|---|
| Buttons on the key | Yes | No | No |
| Climate settings | Yes | Yes | Last status |
| Security information | Yes | Yes | Last status |
| Range | Yes | Yes | Last status |
| Vehicle information | Yes | Yes | Last status |

# G12 Displays and Controls

## 11. Remote Key

### 11.3.3. Charging the battery

Unlike the standard remote key, the Display key has a rechargeable battery.

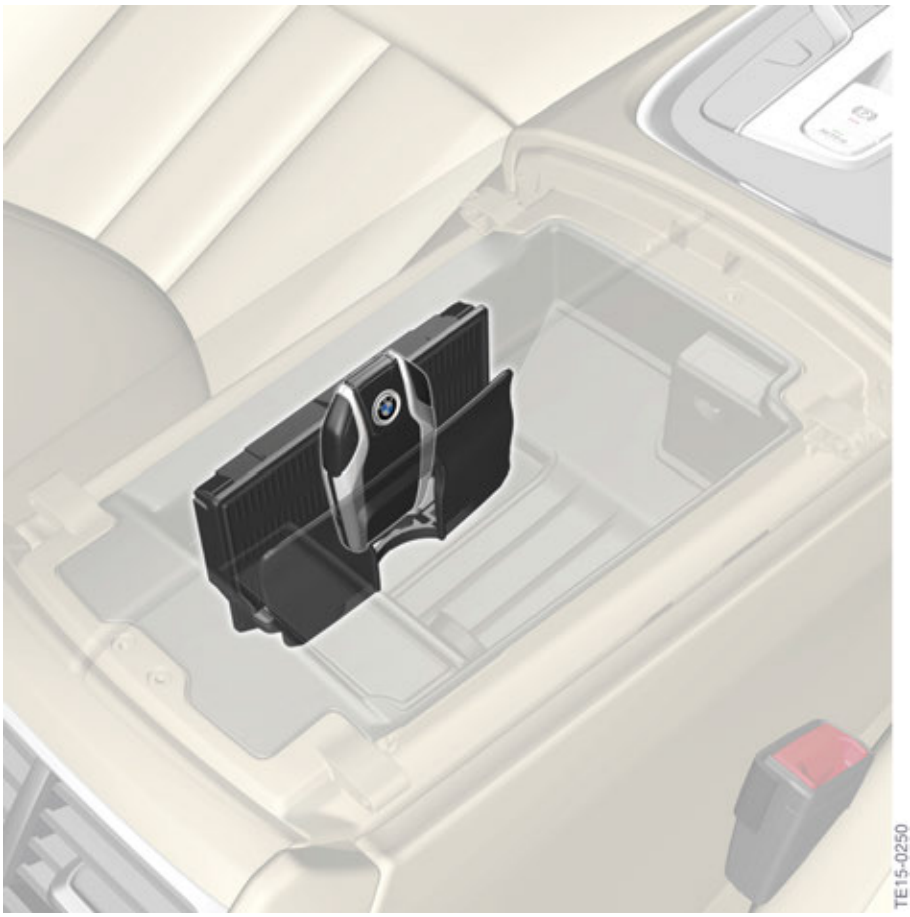
The display is automatically switched off if the state of charge of the Display battery (SA 3DS) falls to a low level. The operability of the standard buttons is maintained until the battery is fully discharged.

The display can be completely switched off in order to prolong the battery life. To do this, press the On/Off button on the side for longer than 4 s.

The battery of the Display key (SA 3DS) can be charged as follows:

- Place the Display key (SA 3DS) in the recess of the Wireless charging tray (WCA) with the locking button at the top.
- Connect the Display key (SA 3DS) to a USB port (charging connection) via the Micro USB port on the left side of the key.

Please note, that if the Display key is completely discharged, the wireless charging tray will not be able to recognize the Display key and charging will not take place. It would be necessary to first have a surface charge via the Micro USB before placing the Display key in the wireless charging tray for charging.




G12 Wireless charging tray

# G12 Displays and Controls

## 11. Remote Key

Smartphones can also be charged in the wireless charging tray. However, there must be only one device for charging in the wireless charging tray.

**Displays of the wireless charging tray**

The state of charge or faults are displayed by an LED on the wireless charging tray. The following table shows the various displays of the wireless charging tray:

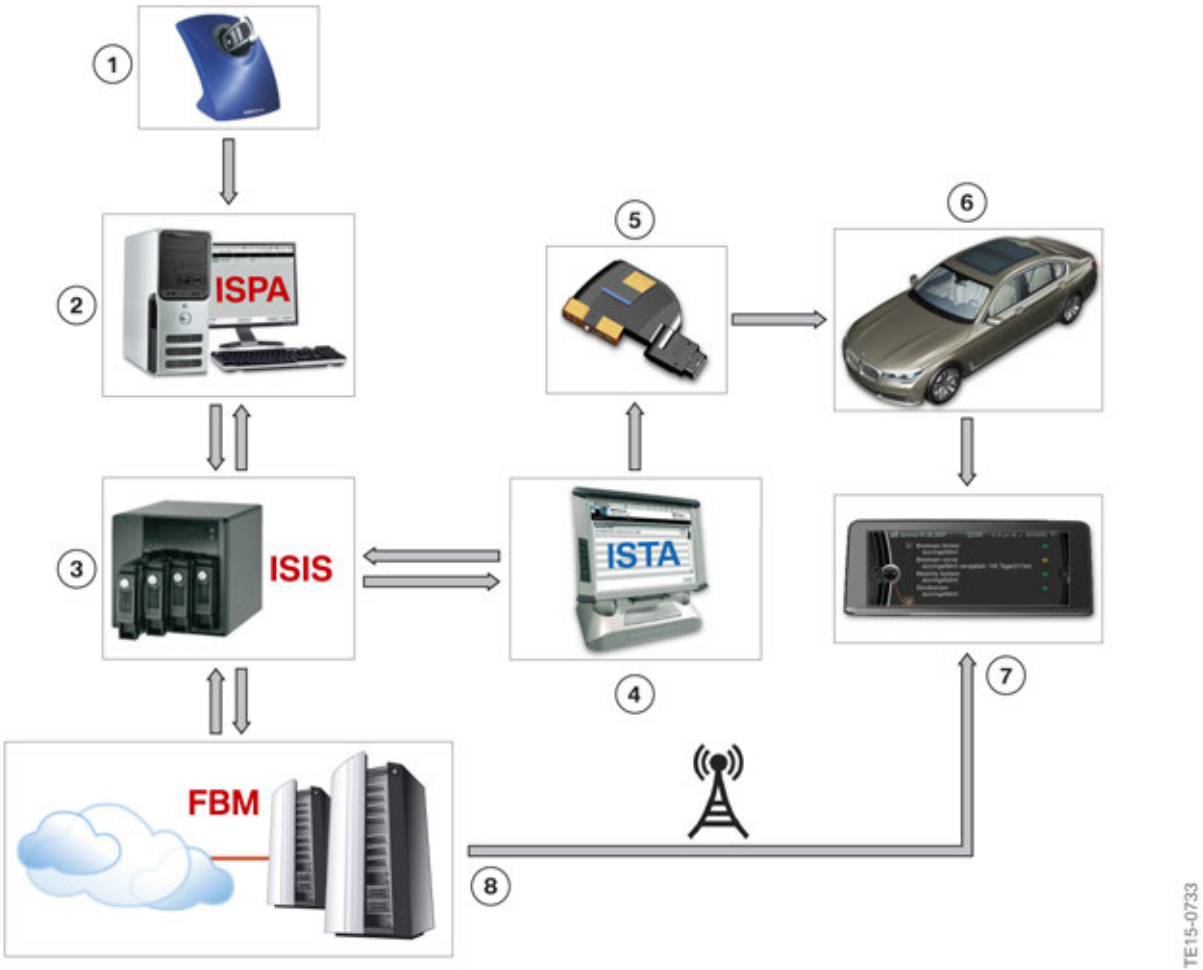
| Color | Explanation |
|---|---|
| Blue | Device is being charged |
| Orange | Device is not being charged |
| Red | Error |

# G12 Displays and Controls

## 12. Service History

As already known by most models of the BMW Group, the BMW 7 Series will no longer be provided with a Service Booklet in paper form.

In addition, the BMW 7 Series also offers the possibility of transferring the data to the vehicle by means of TeleServices, like in the previous models.




G12 Service history function

| Index | Explanation |
|---|---|
| 1 | KeyReader with ID transmitter |
| 2 | Integrated Service Processes Application (ISPA) |
| 3 | ISPI NAS server (ISIS) |
| 4 | Integrated Service Technical Application (ISTA) |
| 5 | Integrated Communication Optical Module (ICOM) |
| 6 | G12 |
| 7 | Central Information Display (CID) |
| 8 | Vehicle description module (FBM) on a server at BMW (data master) |

# G12 Displays and Controls

## 13. Owner's Manual

### 13.1. Integrated Owner's Manual

The BMW 7 Series features an integrated Owner's Manual. The function of the integrated Owner's Manual is unchanged (keyword search, picture search, animations). The graphics are now of a higher quality thanks to the use of a new head unit (Head Unit High 2).

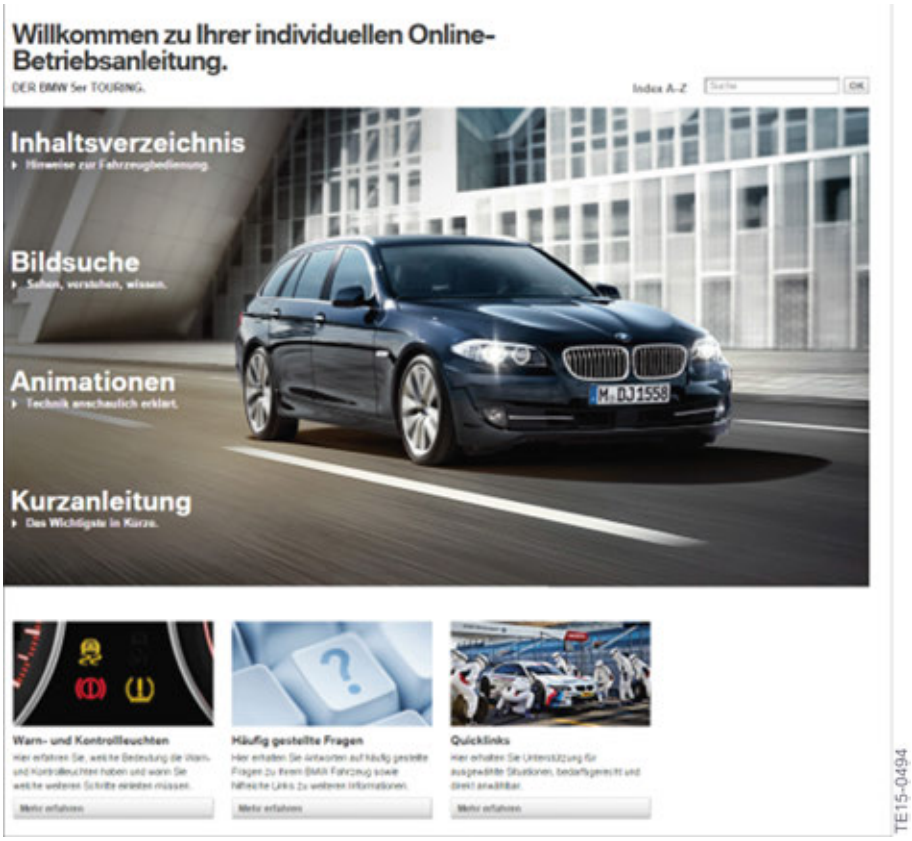

G12 Integrated Owner's Manual

# G12 Displays and Controls

## 13. Owner's Manual

### 13.2. Internet

The Owner's Manual is also available online and can be accessed either in the protected MyBMW area or openly, depending on market. The customer can therefore already inform himself/herself about the vehicle before it is received (internally at BMW, the online Owner's Manual can also be accessed on the Intranet).



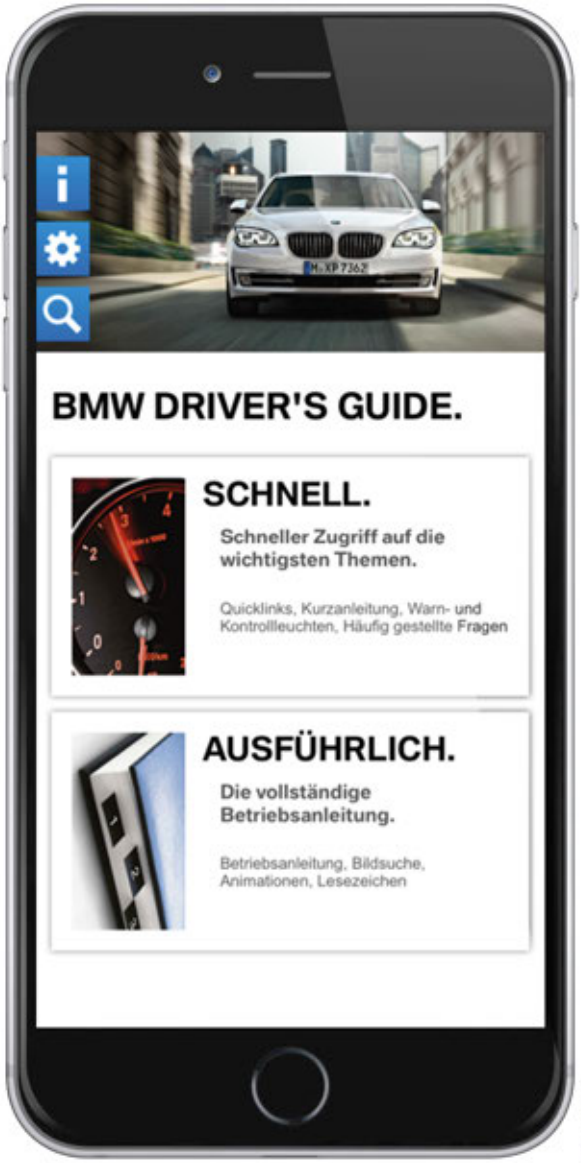

Owner's Manual on internet

# G12 Displays and Controls

## 13. Owner's Manual

### 13.3. BMW Driver’s Guide

The Owner's Manual can also be accessed using a smartphone or tablet via the “BMW Driver’s Guide” app. The app is available from the App Store for (iOS) or Google Play (Android).




BMW Driver’s Guide

Bayerische Motorenwerke Aktiengesellschaft
Qualifizierung und Training
Röntgenstraße 7
85716 Unterschleißheim, Germany